

ECOSYSTEM STATUS INDICATORS

Seabirds

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Ecosystem Factors Affecting Seabirds

Food Availability

Seabird foraging and effects of food limitations on seabird populations were addressed in the 2000 Ecosystem chapter (NPFMC 2000). A comprehensive review has not been completed since then. Factors affecting food availability for seabirds include (1) forage fish availability and spatial/temporal changes due to ecosystem effects, (2) commercial fishery removals of forage fish, either through directed catch or bycatch, (3) enhancements to forage fish stock and availability due to commercial fishery removal of predators, and (4) provisioning of food to seabirds through discard and offal from commercial fisheries. We are unaware if a model of these factors has been completed for the North Pacific. There are no directed fisheries for forage fish in federal waters off Alaska, and bycatch information is available through observer data. Work is being started at the Alaska Fisheries Science Center (AFSC) to address item 4, which may lay some groundwork to fill knowledge gaps with regard to the other items.